Amendments to the Specification:

Please delete the paragraph at page 1, lines 28-30.

Please amend page 4, line 29 as follows:

--scintillation layer 20 again consists of includes a plurality of scintillation elements 21 of the--

Please add the following paragraph at page 5, line 21:

-- The innovation has been described with reference to several embodiments. Modifications and alterations may occur to others upon reading and understanding the preceding detailed description. It is intended that the innovation be construed as including all such modifications and alterations insofar as they come within the scope of the appended claims or the equivalents thereof--

Please amend the Abstract on page 8 as follows:

-- The invention relates to a A scintillation layer (20) for a PET-detector [[.]] The scintillation layer (20) consists of includes a plurality of scintillation elements (21) that are joined together in a practically gapless way and that are oriented towards the centre of curvature (24). Depending on the form of the scintillation layer (20), the scintillation elements (21) may have for example the form of a truncated wedge or pyramid.--

Please delete "(Fig. 2)" at page 8, line 7.

Please delete "31446.1" at page 8, line 13.